



FEDERAL COMMUNICATIONS COMMISSION

47 CFR Parts 4 and 9

[PS Docket Nos. 15-80, 13-75; ET Docket No. 04-35; FCC 22-88; FR ID 121451]

Disruptions to Communications; Improving 911 Reliability

AGENCY: Federal Communications Commission.

ACTION: Final rule.

SUMMARY: In this document, the Federal Communications Commission

(Commission) adopts final rules to ensure that 911 special facilities, including Public Safety Answering Points (PSAPs), receive timely and actionable information about 911 service outages that potentially affect them. Also, as a clerical matter, we codify related, previously adopted rule changes which expand the outage reporting exemption for wireless and satellite providers to include “all specific offices and facilities” as that term is defined in the Commission’s Rules.

DATES: Amendatory instructions 2 (§ 4.9(c)(2) and (e)(1)) and 5 (§ 9.19(d)(4)) are effective [INSERT DATE 30 DAYS AFTER DATE OF PUBLICATION IN THE FEDERAL REGISTER], and amendatory instruction 3 (§ 4.9(a)(4), (c)(2), (e), (f)(4), (g)(1), and (h)) is delayed indefinitely. The Federal Communications Commission will announce the effective date of the delayed amendment by publishing a document in the *Federal Register*.

FOR FURTHER INFORMATION CONTACT: Scott Cinnamon, Attorney-Advisor, Cybersecurity and Communications Reliability Division, Public Safety and Homeland Security Bureau, (202) 418-2319 or via e-mail at Scott.Cinnamon@fcc.gov.

For additional information concerning the Paperwork Reduction Act information collection requirements contained in this document, send an email to PRA@fcc.gov or contact Nicole Ongele, Office of Managing Director, Performance Evaluation and

Records Management, 202-418-2991, or by email to PRA@fcc.gov.

SUPPLEMENTARY INFORMATION: This is a summary of the Commission's *Second Report and Order*, FCC 22-88, adopted on November 17, 2022, and released on November 18, 2022. The document is available for download at the following website: <https://docs.fcc.gov/public/attachments/FCC-22-88A1.pdf>. To request this document in accessible formats for people with disabilities (e.g., Braille, large print, electronic files, audio format, etc.) or to request reasonable accommodations (e.g., accessible format documents, sign language interpreters, CART, etc.), send an email to FCC504@fcc.gov or call the FCC's Consumer and Government Affairs Bureau at (202) 418-0530 (voice), (202) 418-0432 (TTY).

Final Paperwork Reduction Act of 1995 Analysis

The *Second Report and Order* requires originating service providers (OSPs) and covered 911 service providers to adjust their 911 outage reporting procedures which represent new and modified information collection requirements subject to the Paperwork Reduction Act of 1995 (PRA), Public Law 104-13. The document will be submitted to the Office of Management and Budget (OMB) for review under section 3507(d) of the PRA and, with the exception of the revision to 47 CFR 4.9(e)(1)(iv), will not take effect until approved by OMB. OMB, the general public, and other Federal agencies will be invited to comment on the new or modified information collection requirements contained in this proceeding. In addition, we note that pursuant to the Small Business Paperwork Relief Act of 2002, Pub. L. 107-198, *see* 44 U.S.C. 3506(c)(4), we previously sought specific comment on how the Commission might further reduce the information collection burden for small business concerns with fewer than 25 employees.

Congressional Review Act:

The Commission has determined, and the Administrator of the Office of Information and Regulatory Affairs, Office of Management and Budget, concurs, that this

rule is non-major under the Congressional Review Act, 5 U.S.C. 804(2). The Commission will send a copy of the *Second Report and Order* to Congress and the Government Accountability Office pursuant to 5 U.S.C. 801(a)(1)(A).

Synopsis

1. In this final rule, we adopt rules and procedures that (a) require covered 911 service providers and OSPs to maintain accurate contact information for the 911 special facilities in areas that they serve; (b) harmonize the 911 special facility outage notification requirement for both covered 911 service providers and OSPs; (c) continue to require covered 911 service providers to file an annual certification with the FCC addressing the reliability of their systems; and (d) direct covered 911 service providers who cease operations to notify the Commission.

A. Require covered 911 service providers and OSPs to maintain up-to-date 911 special facility contact information

2. We require both covered 911 service providers and OSPs to gather and maintain up-to-date contact information for the 911 special facilities in areas they serve. When 911 outages occur, 911 special facilities lead efforts to notify the public about the outage and establish alternative means of reaching emergency services, which can save lives. 911 special facilities cannot play this important role, however, when they do not receive notification about 911 outages from service providers in their area, which can occur when the service provider does not have an effective point of contact for the 911 special facility. Based on our experience with 911 special facility outage notification over the years, we agree with Association of Public-Safety Communications Officials-International, Inc. (APCO) that “service providers possess the necessary resources, are already required under Commission rules to notify [911 special facilities] of outages, and already maintain their own databases for contacting [911 special facilities].” It is critical that service providers maintain up-to-date contact information for 911 special facilities so

that they can discharge their 911 outage notification obligations.

3. We require covered 911 service providers and OSPs to annually use special diligence to obtain a 911 special facility's contact information and maintain it up-to-date. "Special diligence" is the diligence expected from a person practicing in a particular field of specialty under circumstances like those at issue. The Commission has imposed this higher level of care in circumstances where a failure to take sufficient care can lead to particularly serious public harms. In these circumstances, "special diligence" would require, for example, actively seeking to confirm the accuracy of contact information and not relying on the absence of a response. We disagree with CTIA--The Wireless Association (CTIA) and others that argue that special diligence should only require three attempts to contact the 911 special facility using at least two different types of media (e.g., email, phone, text). We believe that this approach would defeat the purpose of this requirement, as instead of incentivizing providers to ascertain and update such contact information to prepare for anticipated natural disasters or other emergencies, it would allow 911 service providers and OSPs to satisfy their obligations during such emergencies by simply reaching out to what may well be an outdated point of contact. Obtaining, maintaining, and annually confirming up-to-date accurate contact information for 911 special facilities is the overarching goal of this requirement, so requiring a higher level of care than reaching out to the prior contact is imperative to ensure public safety. Providers may deem it appropriate to maintain documentation of their attempts to annually obtain and maintain up-to-date contact information from the 911 special facilities they serve, including by escalating their elicitation of contact information to state or local 911 authorities where a 911 special facility is not immediately responsive. These requirements do not relieve a provider from any requirement in current consent decrees with the Commission to obtain and maintain up-to-date contact information for 911 special facilities.

B. Harmonizing 911 special facility notification for covered 911 service providers and OSPs

4. We conclude that, as proposed, we should harmonize OSPs' notification requirements with those of covered 911 service providers. Providers and public safety organizations strongly suggest that a 911 special facility notification process with uniform content, means, timing, and frequency of notification will simplify compliance for providers and reduce confusion for 911 special facilities. Namely, we require covered 911 service providers and OSPs to notify 911 special facilities about outages by providing the same notification content, by the same means, and with the same timing and frequency. Covered 911 service providers and OSPs shall include the same industry-standard informational elements in their 911 special facility notifications. As covered 911 service providers do today, OSPs shall transmit their 911 special facility notifications by telephone and in writing via electronic means in the absence of another method mutually agreed upon in writing in advance by the 911 special facility and the provider. OSPs and covered 911 service providers shall transmit initial 911 special facility notifications as soon as possible, but no later than 30 minutes after discovering that they have experienced an outage that potentially affects a 911 special facility and will communicate additional material information to potentially affected 911 special facilities as the information becomes available, but no later than two hours after the initial notification. 47 CFR 4.9(h).

5. Some commenters claim that the scope of the existing notification requirements does not include general network outages. Specifically, some argue that the Commission's current rules require OSPs to notify 911 special facilities about outages that affect only 911 service, but not about outages that affect general calling, even if that outage prevents 911 calls from being transmitted to the PSAP. The Commission's rules make clear, however, that notification to a 911 special facility is required when an outage

“potentially affects a 911 special facility” under § 4.5(e)(1) to the extent that the outage results in “a loss of communications to PSAP(s) potentially affecting at least 900,000 user-minutes and the failure is neither at the PSAP(s) nor on the premises of the PSAP(s); no reroute for all end users was available; and the outage lasts 30 minutes or more.”

CTIA argues that the Commission confirmed CTIA’s interpretation of the outage reporting rules when adopting notification rules for interconnected voice over Internet protocol services (VoIP) providers because those rules distinguish between outages that “affect all interconnected VoIP calls, not just calls to 9-1-1” and those “that potentially affect a 9-1-1 special facility.” The distinction that *Report and Order*, 77 FR 25088 (April 27, 2012), 27 FCC Rcd 2650 para. 99 & n.214, made was warranted because some general outages may not “potentially affect a 911 special facility.” When general outages do “potentially affect a 911 special facility,” however, service providers, including interconnected VoIP providers, must notify 911 special facilities. This approach ensures that PSAPs stay informed about outages that affect their operations, as it would not serve the purpose of the rule to solely require PSAPs be notified about outages to a service provider’s 911-specific services but not require notification about more extensive outages that prevent the delivery of all calls (including 911 calls). Service providers are only required to notify 911 special facilities about outages that potentially affect that facility. If an outage does not result in loss of communications to a PSAP, then no PSAP is required to be notified although notification to the Commission may still be required.

6. The 911 special facility notification requirements we adopt in this final rule apply to all covered 911 service providers and OSPs. As the Boulder Regional Telephone Service Authority (BRETSA) observes, whether the outage affects a covered 911 service provider, or a wireless, wireline, cable, satellite, or VoIP service provider, to the public and PSAPs, the inability of people in need of emergency assistance to reach 911 is just as serious. No commenter raises a concern about any particular type of

service provider's ability to comply with the harmonized 911 special facility outage notification requirements we adopt in this final rule except Voice on the Net Coalition (VON), who claims that because interconnected "VoIP providers rely on third party service providers . . . to manage and route 911 calls, . . . unless there is a complaint from an end user customer unable to complete a 911 call" a VoIP provider would be unaware of the outage and by then, more than likely, the affected PSAPs would already have notice of the outage." We note that 47 CFR 4.9(g)(1)(i) requires VoIP providers to notify 911 special facilities of outages that potentially affect them. Reconsidering that rule is outside of the scope of this proceeding. Moreover, VoIP providers routinely file NORS reports with the Commission when reportable 911 outages in their systems occur.

7. Reliance upon a third-party service provider to manage, route, or otherwise contribute to 911 call processing does not relieve a covered 911 service provider or an OSP, including an interconnected VoIP provider, of the obligation to provide notification to 911 special facilities under this rule. It is the duty of covered 911 service providers and OSPs, including interconnected VoIP service providers, to provide 911 service in accordance with the Commission's rules. Where a covered 911 service provider or an OSP supports 911 calling through a contractual arrangement with a third-party, we will hold those service providers accountable for compliance with their notification obligations. In this regard, the Commission has long held that licensees and other regulatees are responsible for the acts and omissions of their employees and independent contractors and has recognized that under long established principles of common law, statutory duties are nondelegable.

8. *Content.* We conclude that, as proposed, we should require covered 911 service providers and OSPs to provide the following material informational elements in their 911 special facility outage notifications:

- An identifier unique to each outage;

- The name, telephone number, and email address at which the notifying service provider can be reached for follow-up;

- The name of the service provider(s) experiencing the outage;

- The date and time when the incident began (including a notation of the relevant time zone);

- The type of communications service(s) affected;

- The geographic area affected by the outage;

- A statement of the notifying service provider's expectations for how the outage potentially affects the 911 special facility (e.g., dropped calls or missing metadata could include an intermittent, partial, or complete loss of Automatic Location Identification (ALI) or Automatic Number Identification (ANI), the absence of which could prevent a 911 special facility from timely deploying first responders to the caller's location);

- The expected date and time of restoration, including a notation of the relevant time zone;

- The best-known cause of the outage; and

- A statement of whether the message is the notifying service provider's initial notification to the 911 special facility, an update to an initial notification, or a message intended to be the notifying service provider's final assessment of the outage.

These informational elements were developed by the Network Reliability Steering Committee Situational Awareness for 9-1-1 Outages Task Force Subcommittee (NRSC Task Force) and proposed in the *Third Notice of Proposed Rulemaking (NPRM)*, 86 FR 34679 (June 30, 2021). The unique outage identifier was proposed separately by the NRSC Task Force and included in the *Third NPRM* with a request for comment.

Commenters overwhelmingly support covered 911 service providers' and OSPs' use of a standardized set of informational elements in their 911 outage reports so that 911 special

facilities will receive timely, accurate, and actionable information in a consistent format from all of the providers within their service area. T-Mobile expressed readiness “to modify its outage notification to PSAPs to include this information” when the new rule becomes effective. Texas 911 Entities “urges the Commission to adopt the specific informational elements [proposed] as reasonable and potentially helpful; but [to] also include as a required specific information element the ATIS NRSC [Alliance for Telecommunications Industry Solutions Network Reliability Steering Committee] Task Force recommended Unique Incident Identifier.” The National Emergency Number Association (NENA) states “[h]armonization will provide 9-1-1 with more reliable, actionable information, and will streamline the channels and means by which 9-1-1 receives outage notifications” and also supports the use of a Unique Incident Identifier.

9. We defer action on our proposal to require covered 911 service providers and OSPs to include geographic information system (GIS) data relevant to the geographic area affected by a 911 outage in their 911 special facility outages notifications. We agree with Verizon, USTelecom, and Lumen that including such data at this time might involve potentially burdensome IT changes. Moreover, some commenters argue that many 911 special facilities do not currently have the ability to receive or make use of GIS information. However, other commenters argue that graphical outage information other than GIS information could be useful to 911 special facilities, which do “rely on GIS for a variety of mapping needs.” In addition to a lack of clarity in the record as to the current capabilities of PSAPs, we do not have a sufficient record on alternative kinds of graphical information that would be useful to 911 special facilities. We direct the Public Safety and Homeland Security Bureau to gather for future consideration additional information on 911 special facilities’ capabilities to use graphical outage information, the utility of that information for 911 outage remediation, and the formats in which the graphic information would be feasible for service providers to produce.

10. We disagree with the suggestions of USTelecom and Verizon that providers should not be required to share the “best known cause” of an outage due to national security and business competition concerns. Covered 911 service providers have been required to transmit “the nature of the outage [and] its best known cause” to 911 special facilities no later than two hours after their initial contact with the 911 special facility since 2013. Until this proceeding, we have had no reason to address stakeholder concerns about confidentiality as a result of this disclosure until receiving the comments of USTelecom and Verizon. Including “best known cause” as an informational element is necessary because, if known, the cause of the outage can provide guidance which might assist the 911 special facility in mitigating the effect of the outage. To allow providers sufficient flexibility in their initial assessment of “best known cause,” the ATIS NRSC task force suggests simply stating whether the cause was hardware, software, or network related. We endorse that approach in instances where disclosure of greater detail could implicate national security issues. We conclude that describing an outage’s “best known cause” at this level of generality in such instances will allow 911 special facilities to better determine whether they can play a role in outage management and remediation without disclosing information that implicates national security or business competition issues.

11. *Means.* We conclude that, as proposed, we should require OSPs to notify 911 special facilities of outages that potentially affect them by telephone and in writing by electronic means, as covered 911 service providers do. Some commenters showed a preference for electronic notification while others suggested that there is room for both electronic and telephonic notifications. We will maintain the dual notification requirement to provide the greatest assurance that a 911 special facility, regardless of their size or capability, will receive the outage notification, whether administrative lines are affected by an outage preventing receipt of a telephone call, or internet service is

down preventing receipt of an email.

12. Nevertheless, we also allow OSPs to notify 911 special facilities by alternative means if mutually agreed upon in writing in advance by the 911 special facility and the provider, as we currently allow covered 911 service providers to do. This also allows a 911 special facility to request delivery by an electronic means other than email, or solely by electronic means. For example, if a provider and a 911 special facility agree in writing in advance of an outage that outage notifications be provided only by text message, then no telephonic notice shall be required. Service providers can notify 911 special facilities in the manner described by their written agreement. This approach recognizes that 911 special facilities have varying staff resources and degrees of technological sophistication. Thus, as T-Mobile suggests, we will “provide [OSP]s the flexibility to provide notifications and related updates in the manner desired by the [911 special facility] (email, phone, or both), rather than mandate specific means of communicating an outage.”

13. *Timing.* We conclude that, as proposed, we should require covered 911 service providers and OSPs to notify 911 special facilities of outages as soon as possible, but no later than within 30 minutes of when the outage that potentially affects 911 service is discovered. These initial notifications are intended to provide preliminary notice of a potential problem to a 911 special facility so that the 911 special facility can, as quickly as possible, “mitigate the impacts of the outage and, as necessary, alert the public to alternative means of connecting to 911.” If a 911 special facility does not receive timely outage notification, it cannot effectively initiate alternate means of communications and provide access for those populations impacted by the outage. According to the Maryland NG911 Commission, when OSPs wait longer than 30 minutes to provide the initial notification of an outage, it limits the ability of 911 special facilities to timely publicize alternative methods for contacting emergency services during many 911 outages. As we

believe there is ample precedent that describes what constitutes “discovery” for purposes of this rule, we decline the request of CTIA and others to define “discovery” as the time when a provider both confirms that the service disruption constitutes a reportable outage and confirms the identities of the potentially affected PSAPs. We believe that such a definition of discovery would disincentivize providers from learning as much about an outage as quickly as possible. This would undermine the requirement’s purpose of providing 911 special facilities with notice of a potential problem so they quickly take mitigating actions. It would also be inconsistent with the important goal of creating uniform notification requirements as between covered 911 service providers and OSPs. We also decline the request of CTIA and others to clarify that an OSP is under no obligation to notify a 911 special facility if the OSP discovers an outage only after it has been resolved, as it also would disincentivize OSPs from rapidly investigating outages and would therefore be inconsistent with the purpose of the requirement.

14. Consistent with our reasoning above, reliance upon a third-party service provider to manage, route, or otherwise contribute to 911 call processing does not relieve a service provider of its obligation to notify 911 special facilities about outages that potentially affect them within 30 minutes of when the outage is discovered—even if the discovery is first made by the third party. Service providers, including providers of interconnected VoIP service, are responsible for providing 911 service in accordance with the Commission’s rules, and this includes responsibility for transmitting the required information to a PSAP, designated statewide default answering point, or appropriate local emergency authority. Thus, the obligation to notify a 911 special facility within 30 minutes is triggered when the outage is discovered, regardless of whether it is discovered by a third-party transport provider or covered 911 service provider. We expect service providers to address these responsibilities within their 911 service contracts with third parties as needed.

15. Service providers must provide 911 special facilities with all available material information they have about the outage 30 minutes from the time of discovery, even if the service provider does not have available all the informational elements described above. We agree with NENA that “a notification’s utility to 9-1-1 diminishes significantly as time passes.” At the same time, we acknowledge CTIA’s point that wireless providers may not have all the required information to transmit the outage notification to 911 special facilities within 30 minutes. We disagree with CTIA, Lumen, and others who request that the Commission apply this 30-minute notification deadline flexibly by allowing providers to merely begin, and not complete, the notification to 911 special facilities within 30 minutes. As the record demonstrates, all 911 special facilities need outage notifications as soon as possible and an approach that would potentially allow service providers – contrary to our established requirement for covered 911 service providers -- to delay some 911 special facilities’ outage notifications for hours after discovery would not serve the public safety purposes of the rule. Lumen additionally argues that the non-fixed nature of VoIP services makes it particularly challenging for interconnected VoIP providers to notify PSAPs of outages within 30 minutes and risks “over-notifying PSAPs out of an abundance of caution.” On balance, we believe the public safety interests served by PSAPs quickly receiving outage notifications outweigh the risk of inaccuracies or over-notification.

16. We decline to mandate a period of fewer than 30 minutes for covered 911 service providers and OSPs to notify 911 special facilities about outages that potentially affect them, as some commenters request. While we require covered 911 service providers and OSPs to notify 911 special facilities about outages that potentially affect 911 as soon as possible – which could be less than 30 minutes in some circumstances – we are persuaded by the comments of providers that a deadline of less than 30 minutes would not allow sufficient time for covered 911 service providers or OSPs to gather and

transmit meaningful information to potentially affected 911 special facilities in all instances. In this connection, we disagree with AT&T that “the Commission is elevating the speed of [911 special facility] notifications over accuracy.” Rather, with the approach we adopt in this final rule, we strike a balance between the need for timely and actionable 911 outage information and the accuracy of that information.

17. *Frequency.* We conclude that, as proposed, OSPs should update 911 special facilities with additional, material outage information as soon as possible after it becomes available and no later than two hours after the provider’s initial notification, as covered 911 service providers already do. Material information for the purpose of this follow up notification consists of the same informational elements that we require covered 911 service providers and OSPs to disclose in their initial notification, if available. We agree with NENA that the two-hour follow-up deadline will produce “predictability in notification frequency [which] will significantly assist [911 special facilities] in analysis and mitigation of network outages.” NCTA opposes a follow up notification requirement for OSPs because it could make it harder to notify relevant 911 special facilities and “would likely not lead to the sharing of useful information.” The follow-up notification requirement we adopt in this final rule, however, does not introduce any additional complexity into the determination of which 911 special facilities should receive notice of an outage. Even where a 911 outage remains unresolved after two hours without any new, material information becoming available in the intervening period, an obligation to provide an update no later than two hours after initial contact provides better information to 911 special facilities than having them assume there is no news if they do not have an update from the service providers. CTIA and others encourage the Commission to prepare 911 special facilities for an increased volume and frequency of notifications by OSPs. We decline this suggestion because, to the contrary, APCO states the problem with 911 special facility outage notification today is not too

many notifications, but too few. Indeed, APCO asks the Commission to lower the threshold for a reportable outage. Providers argue that such a change to the current trigger for these outage notification requirements would require extensive changes to their systems whose benefits would not outweigh the costs. We direct the Public Safety and Homeland Security Bureau to gather for future consideration information on the volume of 911 outages that may go unreported under the Commission's existing outage notification thresholds and seek additional comment on possible alternative outage reporting thresholds.

18. In this connection, we note that, for outages that last longer than two hours, a service provider's obligation to continue to follow up with additional material information as soon as possible after it becomes available continues until the outage is completely repaired and service is fully restored. This ongoing cadence of notifications ensures that speed and accuracy of 911 special facility notifications are not mutually exclusive. After providing initial notification no later than 30 minutes after discovering the outage, service providers have an opportunity to provide more information and make any corrections that may be necessary to their prior statements about the outage. Under the rules we adopt in this document, the conclusion of any outage would constitute material information because it would represent a change in at least "the expected date and time of restoration." Such a notification would likely represent "a service provider's final assessment of the outage," and should be described as such, if appropriate. Just as timely and accurate information is needed for 911 special facilities to assist service providers in mitigating the disruptions caused by network outages, it is equally important for 911 special facilities to know when the outage has been resolved so that normal services and processes can be restored as soon as possible.

19. *Outage notifications directly to customers.* We decline to adopt our proposal that OSPs and covered 911 service providers directly notify their customers

about 911 outages. ATIS states that disclosing information about where 911 service is unavailable would provide bad actors with information on vulnerable locations. Several commenters state that direct customer notification from service providers has the potential to cause confusion and result in notification fatigue to customers. Several commenters suggested that notice of 911 service outages should come from 911 special facilities and state or local governments, not providers, because public organizations have accountability for public safety.

20. We also note that the Commission has adopted and implemented new information sharing rules that allow state and local officials access to the information in outage reports filed with the Commission in the Network Outage Reporting System (NORS) and Disaster Outage Reporting System (DIRS) (<https://www.fcc.gov/outage-information-sharing>). This access will provide public safety agencies with situational awareness never before available, allowing for these state and local agencies to keep their communities aware of the status of 911 services in their communities.

C. Maintain the annual 911 certification reporting requirement

21. We decline to reduce the frequency by which covered 911 service providers file 911 reliability certifications, as proposed, in light of the limited record that the Commission received on this issue. We instead continue to require covered 911 service providers to file 911 reliability certifications annually. We find that maintaining an annual frequency for 911 reliability certification is necessary to ensure that our 911 network remains resilient and robust as the use of our 911 network continues to expand. As the transition to NG911 continues, more and more 911 special facilities are swapping out legacy systems for new equipment and these annual certifications enable the Commission to monitor implementation and performance of the new equipment. NENA reports that the number of 911 calls annually continues to increase. In fact, in 2019 alone, over 200 million emergency calls were placed to 911, and of those calls, 70% were

from wireless phones. As APCO states, “[a]ny burden on submitting the annual certification . . . is outweighed by the interest in continuing to promote the seriousness and significance of ensuring reliable and resilient 9-1-1 networks.” Given all of these factors, and the overall importance of maintaining the reliability of 911 networks despite all these changes, we agree with BRETSA that “[i]t should not be too much to expect covered 9-1-1 providers to make the annual certifications required by the Commission.” The three commenters supporting a reduction in the frequency of the filing of the reliability certifications did not provide evidence that this change would reduce the providers’ regulatory burden substantially without negatively impacting 911 system reliability.

22. The record suggests that making the obligation to file 911 reliability certification less frequent would not meaningfully reduce the burden of compliance for covered 911 service providers. The commenters who proposed filing 911 reliability certifications less often than annually did not offer a compelling analysis of what specific cost reduction would result from the change in filing frequency. AT&T does estimate that “it requires more than 2,000 hours per year to review and validate the information it includes on these [certification] worksheets.” However, even if we could estimate the costs associated with those 2,000 hours, it is unclear how many of those 2,000 hours would be saved if filing the certification was required biennially or triennially. Whether or not a covered 911 service provider is required to file an annual certification in a given year, it would still be required to create and maintain records supporting compliance with the elements of the 911 reliability certification and retain those records for two years. Given that the records still must be created and maintained, we conclude that any cost savings realized in changing the frequency of the filing of 911 reliability certification would be outweighed by the value of maintaining the annual filing.

D. Require covered 911 service providers who cease operations to notify

the Commission

23. The Commission adopts its proposal requiring covered 911 service providers that cease operations to advise the FCC by filing a notification no later than 60 days after the cessation of service, except that we will allow for the notification to be a declaration under penalty of perjury rather than affidavit, as AT&T suggests, which is consistent with our rules. The Commission received no opposition to this proposal. We emphasize that the notification is required only when a covered 911 service provider completely ceases providing covered 911 services as opposed to a situation where a covered 911 service provider might cease service to a particular 911 special facility. We adopt this measure “to ensure that the Commission does not expend time and resources to investigate why a covered 911 service provider has failed to file its 911 certification in a timely manner, when the reason is simply because the provider is no longer a covered 911 service provider and is therefore no longer required to file the required certifications,” as proposed.

E. Codify previously adopted rule changes

24. Section 4.9 of the Commission’s rules sets forth the outage reporting requirements for different service providers including wireless and satellite providers. Initially, the rules exempted wireless and satellite providers from having to report on outages at airports. The rationale was that wireless and satellite providers did not have dedicated equipment in place at airports because much of the communications was conducted through wireline facilities. In 2016, the Commission adopted the *2016 Part 4 Order*, 81 FR 45055 (July 12, 2016), that expanded the reporting exemption for satellite and wireless providers to include “all special offices and facilities” as that term is defined in § 4.5(b) of the rules (i.e., to “entities enrolled in the Telecommunications Service Priority (TSP) Program at priority Levels 1 and 2, which may include, but are not limited to, major military installations, key government facilities, nuclear power plants, and those

airports that are listed as current primary (PR) airports in the FAA's [Federal Aviation Administration] National Plan of Integrated Airports Systems (NPIAS))." The changes to § 4.9 of the rules adopted in the *2016 Part 4 Order* were not codified into our rules. In the *Third NPRM*, we proposed to codify the rule as previously adopted.

25. In the absence of comments on this issue, we amend our part 4 rules to expand the outage reporting exemption for satellite and wireless providers to include all "special offices and facilities" as defined in § 4.5(b), as adopted in the *2016 Part 4 Order*. While wireless service has become ubiquitous throughout the United States, it has not yet been adopted by special offices and facilities for their critical communications.

F. Compliance Timeframe

26. *New rules for collecting and maintaining 911 special facility contact information.* The rules we adopt in this document requiring covered 911 service providers and OSPs to gather, update, and maintain accurate contact information for officials designated to receive outage notification at each 911 special facility in areas that they serve require review by the Office of Management and Budget (OMB) pursuant to the Paperwork Reduction Act (PRA). Following the completion of that review, the Bureau will publish a document in the *Federal Register* announcing the relevant effective date, which will be 120 days after such publication. The record shows that many service providers already have accurate contact information for the 911 special facilities in their service areas enabling accurate outage reporting. For those service providers that do not already have up-to-date contact information for 911 special facilities in areas that they serve, we anticipate they will use the time between now and the expiration of the 120-day period to develop and implement procedures needed to initially obtain accurate contact information through the special diligence process. Once providers have a contact list in place, special diligence would require them to annually verify the accuracy of their 911

special facility contact list to maintain it up-to-date.

27. *New rules to harmonize reporting requirements for part 4 and covered 911 service providers.* The rules we adopt in this document requiring OSPs to modify the means, timing, and frequency of their outage notification templates to conform with those provided by covered 911 service providers, and for covered 911 service providers and OSPs to adjust the content of their outage notifications to conform with the information template designed by ATIS, will require review of the new and modified information collection requirements by OMB under the PRA. Following the completion of that review, the Bureau will publish a document in the *Federal Register* announcing the relevant effective date, which will be 120 days after such publication. This compliance period will allow covered 911 service providers and OSPs to modify and standardize the informational elements that they provide to 911 special facilities, including through use of the preexisting and freely available ATIS PSAP notification template. It will allow OSPs to, in parallel, make any procedural changes that may be necessary to notify 911 special facilities in areas they serve about outages that potentially affect them within 30 minutes of discovery, including by automating their notification processes to the extent warranted. It will allow OSPs to develop procedures to notify 911 special facilities by telephone and electronic means, or to establish in writing another mutually agreeable notification method, including through the contact information elicitation process described above. T-Mobile said that it “stands ready to modify its outage notifications to PSAPs to include this information by the effective date proposed in the [*Third NPRM*],” and we suspect many other providers are similarly prepared for the changes adopted here. We do not anticipate that OSPs will need to expend substantial time or resources to come into compliance with our follow-up notification requirement because service providers can use the same procedures to follow up with 911 special facilities as they use to notify 911 special facilities in the first instance.

28. We require covered 911 service providers to notify the FCC when they cease operations as of the date 30 days after publication in the *Federal Register* announcing the completion of OMB review. We anticipate that any additional time and resources that covered 911 service providers might expend to comply with this requirement would be negligible because service providers winding down their businesses already provide notification of the occurrence to their stakeholders, and the Commission does not require this notice to contain any particular content that might pose an additional burden to compile.

29. Finally, the exemption that we have decided to codify in this final rule for reporting outages at special offices and facilities in addition to airports will be effective 30 days after the Bureau publishes a document in the *Federal Register* announcing the codification of this already adopted rule. The codification of this existing exemption eliminates any burden that may have been attendant to the provision of these reports.

G. Benefits and costs

30. We determine that the rules we adopt in this document concerning the creation and maintenance of a 911 special facility contact list will result in a one-time compliance cost of \$149,000 and an annual recurring cost of \$1,652,000. We sought comment on these cost estimates in the *Third NPRM* and received no persuasive objection or alternative calculation in response. We conclude that the one-time cost for covered 911 service providers and OSPs to create an email survey to elicit 911 special facility contact information that operate in the areas they serve will be \$50,000, and the one-time cost to harmonize the covered 911 service provider and OSP 911 special facility outage notification templates will be \$99,000. We note, however, that our analysis is based on averages across all providers and that, whereas some nationwide providers like AT&T likely have higher costs than the average cost we estimate, others, such as local providers, are expected to have lower costs. We believe the majority of 911 special

facilities will respond to the email survey, limiting the number of follow-up calls necessary to establish the initial contact list. The rules we adopt here will result in annual recurring costs for covered 911 service providers and OSPs of \$197,000 for identifying 911 special facilities that could potentially be affected by a service outage, \$197,000 for maintaining and updating 911 special facility contact information for those 911 special facilities that could potentially be affected by a service outage, and \$1,258,000 for notifying 911 special facilities of outages that potentially affect them pursuant to the harmonized notification framework we adopt in this document. The \$1,258,000 recurring cost presented in the NPRM was calculated as follows: To notify 911 special facilities, we propose that a communications equipment operator, earning \$34/hour, would spend a total of one hour per outage to send out two notifications for each of an estimated 37,000 outages, for a total of \$1,258,000 [$\$34/\text{hour} \times 1 \text{ hour} \times 37,000$]. Our estimate of 37,000 outages is based on the incidence of outages that potentially affected 911 in NORS reports during 2020.

31. We recognize that it is difficult to quantify the value of continuity of access to 911 service, which includes its capacity to save lives and mitigate and prevent injuries. In this case, it is only necessary to demonstrate that the public safety value of the proposals adopted in this final rule is reasonably likely to exceed the costs of implementation. People who dial 911 are often in perilous situation where time and accuracy are critical. As we stated in the *Third NPRM*, “the benefits attributable to outage notification are substantial and may have significant positive effects on the abilities of 911 special facilities to safeguard the health and safety of residents during outages that threaten residents’ ability to reach 911.” When 911 service providers and OSPs have timely, actionable information about 911 outages that affect the 911 special facilities including the PSAPs they serve, they are the best able to maintain the public’s access to emergency services when it would otherwise be interrupted. We agree with the

Maryland NG911 Commission that “[w]hen the PSAP does not get timely or complete notification of outages, they cannot effectively initiate alternate means of communication and provide access for those populations impacted by the outage. Public service messaging, crisis communications options, and back-up operations all require time to activate. When the 911 special facility is not informed in a thorough or punctual manner, their ability to trigger alternative methods for their populations to contact emergency services is severely compromised.” The rules we adopt in this document, both individually and taken together, will serve to improve communications between providers and 911 special facilities by requiring providers to maintain develop and maintain an accurate contact list for the 911 special facilities they serve. Consequently, they will also facilitate the prompt ability of 911 special facilities to manage those outages’ impacts on operations and on the public, resulting in more prompt dispatch of service.

32. In the *Third NPRM* we sought comment on what costs savings would be realized if less frequent 911 reliability certifications were required. While there were general suggestions of cost savings if the annual certification requirement was changed to biennial or triennial, the record offered no evidence of specific cost savings. We conclude that there will be no additional costs resulting from our decision to maintain the existing annual certification requirement.

33. We adopt the new rule requiring covered 911 service providers to notify the FCC when they cease operations “to ensure that the Commission does not expend time and resources to investigate why a covered 911 service provider has failed to file its 911 certification in a timely manner, when the reason is simply because the provider is no longer a covered 911 service provider and is therefore no longer required to file the required certifications”. We sought comment on the costs and benefits of this proposal, but commenters were silent on this issue. We conclude that our presumption in the *Third NPRM* is correct and that because there will be few companies that cease their covered

911 service provider operations from year to year, the filings costs will be minimal, while the benefits will be much greater.

34. Finally, our proposal to codify the rule that we adopted in 2016 to extend the exemption for filing network outage reports to all special offices and facilities should not result in any additional costs. It will result in the filing of fewer reports. The record was silent on the issue of cost for this proposal, so we conclude our analysis is correct.

PROCEDURAL MATTERS

35. *Regulatory Flexibility Act Analysis.* As required by the Regulatory Flexibility Act of 1980, as amended (RFA), an Initial Regulatory Flexibility Analysis (IRFA) was incorporated in the Third Notice of Proposed Rulemaking (*Third NPRM*) adopted in April 2021. The Commission sought written public comment on the proposals in the *Third NPRM*, including comment on the IRFA. No comments were filed addressing the IRFA. This present Final Regulatory Flexibility Analysis (FRFA) conforms to the RFA and was attached as Appendix B to the *Second Report and Order*.

A. Need for, and Objectives of, the Final Rules

36. In this proceeding, the Commission adopts rules and procedures to improve the reliability and resiliency of telecommunications networks nationwide and 911 networks specifically so that the American public can continue to reach emergency services without undue delay or disruption. In particular, the *Third NPRM* proposed and sought comment on measures to harmonize the Commission's Public Safety Answering Points (PSAP) outage notification rules such that all service providers must notify all potentially affected 911 special facilities, including PSAPs, of outages in the same manner and with more specific information. The Commission's current rules for 911 special facility outage reporting differentiates between "covered 911 service providers" that provide service directly to 911 special facilities and "originating" or "part 4" service providers that only provide the capability for consumers to originate 911 calls. These new

rules apply to all originating service providers as well as to all covered 911 service providers and make the nation's 911 service more reliable and the public safer, while striking an appropriate balance between costs and benefits of such regulation. We note that cable providers and interconnected VoIP providers often are also wireline providers. The references to providers of these types of services here correspond to references in the part 4 outage reporting rules. We also adopt a rule that requires covered 911 service providers to notify the Commission within 60 days of the day they cease operations. This will conserve Commission resources by avoiding unnecessary pursuit of covered 911 service providers no longer providing service. We also codify rules adopted in 2016 extending the exemption of satellite and terrestrial wireless providers from reporting outages potentially affecting special offices and facilities.

C. Response to Comments by the Chief Counsel for Advocacy of the Small Business Administration

37. The Small Business Administration (SBA) Chief Counsel did not file comments on the IRFA.

D. Description of the Small Entities to Which the Final Rules Will Apply

38. The RFA directs agencies to provide a description of the small entities that may be affected by the rules. The RFA generally defines the term "small entity" as having the same meaning as the terms "small business," "small organization," and "small governmental jurisdiction." In addition, the term "small business" has the same meaning as the term "small business concern" under the Small Business Act. A "small business concern" is one which: (1) is independently owned and operated; (2) is not dominant in its field of operation; and (3) satisfies any additional criteria established by the SBA. The types of entities that will be affected include Cable and Other Subscription Programming Providers, Cable System Operators, Incumbent Local Exchange Carriers, Local Exchange Carriers, Satellite Telecommunications Providers, Wired Telecommunications Carriers,

Wireless Communications Service Providers, Wireless Telecommunications Carriers, Wireless Telephony Operators, Telecommunications Resellers, and All Other Telecommunications, which includes specialized telecommunications service providers, such as satellite tracking, communications telemetry, and radar station operation, and providers of Internet service (e.g., dial-up ISPs) or voice over Internet protocol (VoIP) services.

E. Description of Projected Reporting, Recordkeeping, and Other Compliance Requirements for Small Entities.

39. The rules adopted in the *Second Report and Order* require OSPs, including those that are small entities, to adjust their procedures for obtaining and maintaining contact information for the 911 special facilities they serve and for notifying 911 special facilities of outages that might potentially affect them. These new rules change the content, means, timing, and frequency of the 911 special facilities outage notifications these providers transmit.

40. The rules also require covered 911 service providers to file a notice with the FCC when they discontinue service. The notice should be filed no later than 60 days after the cessation of service and accompanied by a declaration, rather than a notarized affidavit, from a representative of the provider. This is a one-time, minimal burden for those covered 911 service providers that cease operations. Based on our year over year review of annual reliability certifications filed by covered 911 service providers, we anticipate only a small number of these filings each year.

41. We do not believe that the costs and/or administrative burdens associated with any of the proposal rule changes will unduly burden small entities. Furthermore, we believe the value of the public safety benefits generated by our 911 special facility outage notification proposals outweigh the estimated costs. These rule changes will enable 911 special facilities to accelerate the public's ability to reach 911 call takers during an

outage, reducing the probability of lives lost during any such outage. These rules will also generate an additional, incremental benefit by helping people reach 911 call takers more quickly and by reducing first responder response times. Notifying the FCC when a covered 911 service provider ceases operations will prevent the FCC from transmitting and the provider from responding to unnecessary notices regarding the operational status of the provider.

F. Steps Taken to Minimize the Significant Economic Impact on Small Entities and Significant Alternatives Considered

42. The Commission has taken several steps that could reduce the economic impact for small entities. First, the elements for 911 special facility outage notifications that we adopt largely track the NRSC Task Force's template. Therefore, to the extent small entities have or will implement the ATIS NRSC Task Force's template, compliance with our rules should not impose significant additional costs. Next, we adopt an approach that establishes a baseline expectation of shared information while otherwise preserving flexibility for service providers to determine the means by which they present this information to 911 special facilities. Similarly, we do not specify the particular procedures that service providers must develop or follow to elicit 911 special facility contact information.

43. Following review of the record in this proceeding, the Commission has decided not to change the frequency with which covered 911 service providers are required to file 911 reliability certifications. The current annual filing requirement strikes the appropriate balance between maintaining 911 network reliability and public awareness of 911 unavailability.

ORDERING CLAUSES

44. ACCORDINGLY IT IS ORDERED that, pursuant to the authority contained in sections 1, 4(i), 4(j), 4(n), 201(b), 214, 218, 251(e)(3), 301, 303(b), 303(g),

303(r), 307, 309(a), 332, and 403, of the Communications Act of 1934, as amended, and sections 3(b) and 6 of the Wireless Communications and Public Safety Act of 1999, as amended, 47 U.S.C. 151, 154(i), 154(j) 154(n), 201(b), 214, 218, 251(e)(3), 301, 303(b), 303(g), 303(r), 307, 309(a), 332, 403, 615, 615a-1, the *Second Report and Order* is ADOPTED.

45. IT IS FURTHER ORDERED that the amendments of the Commission's Rules as set forth in Appendix A of the *Second Report and Order* are ADOPTED, effective as of the dates set forth above.

46. IT IS FURTHER ORDERED that the Office of the Managing Director, Performance Evaluation and Records Management, SHALL SEND a copy of the *Second Report and Order* in a report to be sent to Congress and the Government Accountability Office pursuant to the Congressional Review Act, 5 U.S.C. 801(a)(1)(A).

List of Subjects in 47 CFR Parts 4 and 9

Airports, Communications common carriers, Reporting and recordkeeping requirements, Telecommunications.

FEDERAL COMMUNICATIONS COMMISSION

Katura Jackson,

Federal Register Liaison Officer,

Office of the Secretary.

Final Rules

For the reasons discussed in the preamble, the Federal Communications Commission amends 47 CFR parts 4 and 9 as follows:

PART 4 – DISRUPTIONS TO COMMUNICATIONS

1. The authority citation for part 4 continues to read as follows:

Authority: 47 U.S.C. 34-39, 151, 154, 155, 157, 201, 251, 307, 316, 615a-1, 1302(a), and 1302(b); 5 U.S.C. 301, and Executive Order no. 10530.

§ 4.9 [Amended]

2. Effective **[INSERT DATE 30 DAYS AFTER DATE OF PUBLICATION IN THE FEDERAL REGISTER]**, amend § 4.9 by:

- a. Adding the word “or” at the end of paragraph (c)(2)(ii);
- b. Removing and reserving paragraph (c)(2)(iii);
- c. Adding the word “or” at the end of paragraph (e)(1)(iii); and
- d. Removing and reserving paragraph (e)(1)(iv).

3. Delayed indefinitely, further amend § 4.9 by:

- a. Revising paragraphs (a)(4) and (c)(2)(iv);
- b. Adding a heading for paragraph (e); and
- c. Revising paragraphs (e)(1)(v), (f)(4), (g)(1)(i), and (h).

The revisions and addition read as follows:

§ 4.9 Outage reporting requirements - threshold criteria.

(a) * * *

(4) Potentially affects a 911 special facility (as defined in § 4.5(e)), in which case they also shall notify the affected 911 facility in the manner described in paragraph (h) of this section. Not later than 72 hours after discovering the outage, the provider shall submit electronically an Initial Communications Outage Report to the Commission. Not later than 30 days after discovering the outage, the provider shall submit electronically a Final

Communications Outage Report to the Commission. The Notification and the Initial and Final reports shall comply with all of the requirements of § 4.11.

* * * * *

(c) * * *

(2) * * *

(iv) Potentially affecting a 911 special facility (as defined in § 4.5(e)), in which case the affected 911 facility shall be notified in the manner described in paragraph (h) of this section.

* * * * *

(e) *Wireless*.

(1) * * *

(v) That potentially affects a 911 special facility (as defined in § 4.5(e)), in which case they also shall notify the affected 911 facility in the manner described in paragraph (h) of this section.

* * * * *

(f) * * *

(4) Potentially affects a 911 special facility (as defined in § 4.5(e)), in which case they also shall notify the affected 911 facility in the manner described in paragraph (h) of this section. Not later than 72 hours after discovering the outage, the provider shall submit electronically an Initial Communications Outage Report to the Commission. Not later than 30 days after discovering the outage, the provider shall submit electronically a Final Communications Outage Report to the Commission. The Notification and the Initial and Final reports shall comply with all of the requirements of § 4.11.

(g) ***

(1) ***

(i) Within 240 minutes of discovering that they have experienced on any facilities that

they own, operate, lease, or otherwise utilize, an outage of at least 30 minutes duration that potentially affects a 911 special facility (as defined in § 4.5(e)), in which case they also shall notify the affected 911 facility in the manner described in paragraph (h) of this section; or

* * * * *

(h) *911 special facility outage notification.* All cable, satellite, wireless, wireline, interconnected VoIP, and covered 911 service providers (as defined in § 9.19(a)(4) of this chapter) shall notify any official at a 911 special facility who has been designated by the affected 911 special facility as the provider's contact person(s) for communications outages at the facility of any outage that potentially affects that 911 special facility (as defined in § 4.5(e)) in the following manner:

(1) *Appropriate contact information.* To ensure prompt delivery of outage notifications to 911 special facilities, cable, satellite, wireless, wireline, interconnected VoIP, and covered 911 service providers shall exercise special diligence to identify, maintain, and, on an annual basis, confirm current contact information appropriate for 911 outage notification for each 911 special facility that serves areas that the service provider serves.

(2) *Content of notification.* Cable, satellite, wireless, wireline, interconnected VoIP, and covered 911 service providers' 911 outage notifications must convey all available material information about the outage. For the purpose of this paragraph (h), "material information" includes the following, where available:

(i) An identifier unique to each outage;

(ii) The name, telephone number, and email address at which the notifying cable, satellite, wireless, wireline, interconnected VoIP, or covered 911 service provider can be reached for follow up;

(iii) The name of the cable, satellite, wireless, wireline, interconnected VoIP, or covered 911 service provider(s) experiencing the outage;

- (iv) The date and time when the incident began (including a notation of the relevant time zone);
 - (v) The types of communications service(s) affected;
 - (vi) The geographic area affected by the outage;
 - (vii) A statement of the notifying cable, satellite, wireless, wireline, interconnected VoIP, or covered 911 service provider's expectations for how the outage potentially affects the 911 special facility (e.g., dropped calls or missing metadata);
 - (viii) Expected date and time of restoration, including a notation of the relevant time zone;
 - (ix) The best-known cause of the outage; and
 - (x) A statement of whether the message is the notifying cable, satellite, wireless, wireline, interconnected VoIP, or covered 911 service provider's initial notification to the 911 special facility, an update to an initial notification, or a message intended to be the service provider's final assessment of the outage.
- (3) *Means of notification.* Cable, satellite, wireless, wireline, interconnected VoIP, and covered 911 service providers' 911 outage notifications must be transmitted by telephone and in writing via electronic means in the absence of another method mutually agreed upon in writing in advance by the 911 special facility and the covered 911 service provider.
- (4) *Timing of initial notification.* Cable, satellite, wireless, wireline, interconnected VoIP, and covered 911 service providers shall provide a 911 outage notification to a potentially affected 911 special facility as soon as possible, but no later than within 30 minutes of discovering that they have experienced on any facilities that they own, operate, lease, or otherwise utilize, an outage that potentially affects a 911 special facility, as defined in § 4.5(e).
- (5) *Follow-up notification.* Cable, satellite, wireless, wireline, interconnected VoIP, and

covered 911 service providers shall communicate additional material information to potentially affected 911 special facilities in notifications subsequent to the initial notification as soon as possible after that information becomes available, but cable, satellite, wireless, wireline and interconnected VoIP providers shall send the first follow-up notification to potentially affected 911 special facilities no later than two hours after the initial contact. After that, cable, satellite, wireless, wireline, interconnected VoIP, and covered 911 service providers are required to continue to provide material information to 911 special facilities as soon as possible after discovery of the new material information until the outage is completely repaired and service is fully restored.

PART 9 – 911 REQUIREMENTS

4. The authority citation for part 9 continues to read as follows:

Authority: 47 U.S.C. 151-154, 152(a), 155(c), 157, 160, 201, 202, 208, 210, 214, 218, 219, 222, 225, 251(e), 255, 301, 302, 303, 307, 308, 309, 310, 316, 319, 332, 403, 405, 605, 610, 615, 615 note, 615a, 615b, 615c, 615a-1, 616, 620, 621, 623, 623 note, 721, and 1471, and Section 902 of Title IX, Division FF, Pub. L. 116-260, 134 Stat. 1182, unless otherwise noted.

5. Effective **[INSERT DATE 30 DAYS AFTER DATE OF**

PUBLICATION IN THE FEDERAL REGISTER], amend § 9.19 by adding paragraph (d)(4) to read as follows:

§ 9.19 Reliability of covered 911 service providers.

* * * * *

(d) * * *

(4) Covered 911 service providers that cease operations must notify the FCC by filing a notification under penalty of perjury no later than 60 days after the cessation of service.

[FR Doc. 2023-01479 Filed: 2/14/2023 8:45 am; Publication Date: 2/15/2023]